

Application No.: 10/037,896

Docket No.: JCLA7228

**REMARKS****Present Status of the Application**

The Office Action rejected all presently-pending claims 1-20. Specifically, the Office Action rejected claims 3,4,5,7,8,9,12,13,18 and 19 as indefinite under 35 U.S.C. 112 second paragraph. The office action also rejected claims 1,2,6,10,11 and 14 under 35 U.S.C. 103(a), as being unpatentable over Zhang et al. (U.S. 2002/0162040A1) in view of Wang et al (U.S.5,886,640). Applicants have cancelled claims 3-5, 7-9, 12-13 and 18-19. Applicants have also amended claim 1 to improve clarity. After entry of the foregoing amendments, claims 1, 2, 6, 10-11, 14-17 and 20 remain pending in the present application, and reconsideration of those claims is respectfully requested.

**Discussion of Office Action Rejections**

The office action rejected claims 1,2, 6, 10, 11 and 14 under 35 U.S.C. 103(a), as being unpatentable over Zhang et al. (U.S. 2002/0162040A1, "Zhang" hereinafter) in view of Wang et al (U.S.5,886,640, "Wang" hereinafter). Applicants respectfully traverse the rejections for at least the reasons set forth below.

The present invention provides a power controller capable of receiving a voltage identification (VID) signal and a microprocessor selection signal to supply a correct specification and terminal voltage to a particular microprocessor in a computer system. *Therefore, the*

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*present invention enables the computer system to have multi-processor type supporting capacity.*

The power controller described in the present invention includes a first voltage identification digital/analogue converter, a second voltage identification digital/analogue converter and a *selector*. The first voltage identification digital/analogue converter receives a voltage identification signal and outputs a first voltage specification signal. The second voltage identification digital/analogue converter receives the voltage identification signal and outputs a second voltage specification signal. *The selector couples with the first voltage identification digital/analogue converter and the second voltage identification digital/analogue converter and outputs either the first voltage specification signal or the second voltage specification signal according to a microprocessor selection signal.*

The features are recited in claims 1, 10 and 15. For example, independent claim 1 recited the features in the following:

1.(currently amended) A power controller for a computer system having a microprocessor therein, wherein the power controller receives a voltage identification signal transmitted from the microprocessor, the power controller comprising:

a first voltage identification digital/analogue converter for receiving the voltage identification signal and outputting a first voltage specification signal;

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*a second voltage identification digital/analogue converter for receiving the voltage identification signal and outputting a second voltage specification signal; and*

*a selector coupled to the first identification digital/analogue converter and the second identification digital/analogue converter for outputting the voltage specification signal from the first voltage identification digital/analogue converter or the second voltage identification digital/analogue converter based on a microprocessor selection signal generated by the computer signal.*

.....

(emphasis added).

Claims 10 and 15 also recite the similar features.

*The reference by Zhang does not teach the second voltage identification digital/analogue converter and the selector as described in the present invention.* Therefore, the VID number, the DAC 27 and the voltage regulator 28 described by Zhang do not fulfill the purpose of selection of a specified voltage, thereby enabling a computer system to have multi-processor type supporting capacity.

*Moreover, Zhang does not describe the microprocessor selection signal,* which is an essential aspect of the present invention. The prior art patent describes a method of determining the power supply voltage for a single microprocessor using its VID number. However, Zhang does not teach or suggest a method of determining the right supply voltage when a motherboard

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supports multiprocessors using a selector and a microprocessor selection signal, as described in the present invention.

*Wang teaches that the upper-limit reference value is first converted by the second D/A converter 90 into analogue form and then sent to the negative input end of the second analogue comparator 110. The negative input end of the first analogue comparator 100 and the positive input end of the second analogue comparator 110 are tied together and connected to the power input line of the CPU 10. (Column 4, lines 42-48) However, Wang does not teach a selector which select one of the voltage signals supplied by the first and the second voltage identification digital/analogue converter using a microprocessor selection signal.*

Therefore, to summarize, the cited references fail to disclose the essential features of the present invention, wherein a plurality of microprocessors are supported on a single motherboard. The prior art references either alone or in combination do not teach a power controller which enables the selection of an appropriate voltage level using a microprocessor selection signal.

For at least the foregoing reasons, Applicant respectfully submits that independent claims 1, 10 and 15 patently define over the prior art references, and should be allowed. For at least the same reasons, dependent claims 2,3,6,7,11,12,14,16,17, and 20 patently define over the prior art as well.

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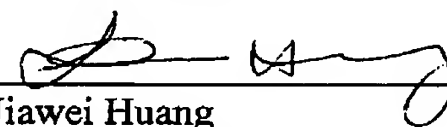
**CONCLUSION**

For at least the foregoing reasons, it is believed that the pending claims claims 1, 2, 6, 10-11, 14-17 and 20 are in proper condition for allowance. If the Examiner believes that a telephone conference would expedite the examination of the above-identified patent application, the Examiner is invited to call the undersigned.

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